DOCKET: CU-4085

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT: Stephen W. Vorley et al

TITLE: MEANS FOR CONNECTING PIPES COMPRISING AN AXIAL PRESS

SURFACE TO TAKE AXIAL PRESSURE FROM A PRELOADING

TOOL

AMENDED CLAIMS

- 1. (currently amended) A means of connecting pipes, comprising a seal (2), flanges (3, 3'), a threaded portion (17) and a nut (5), characterized in that wherein the end portion (1, 1') of the pipe is equipped with a concentric press surface (23) located immediately proximal to the periphery of the pipe (1, 1') and designed to be capable of taking an axial pressure from a preloading tool (25), the pressure directed compressingly towards the pipes' (1, 1') end portions, which pressure is distributed evenly or point-by-point about the periphery of the pipe and sufficient to preload the seal (2), the preload of the seal (2) principally being retained by a corresponding threaded nut (5) and collar (15) after removal of the preloading tool (25).
- 2. (currently amended) A means in accordance with Claim 1,
- c h a r a c t e r i s e d i n that wherein the nut (5) has a flange (10) designed to be able to take an axial pressure from the preloading tool (25), which pressure is distributed evenly or point-by-point about the periphery of the nut (5) and directed towards the pipe flange (3).
- 3. (currently amended) A means in accordance with Claim 1, c h a r a c t e r i s e d i n that a threaded collar's (15) wherein a rear portion of said collar (19) is designed to be able to take an axial pressure from the preloading tool (25), which pressure is distributed evenly or point-by-point about the periphery of the collar (15) and directed towards the pipe flange (3').
- 4. (currently amended) A means in accordance with one or more of the previous Claims, c h a r a c t e r i s e d i n that the threaded collar's (15) Claim 1 wherein a rear portion (19) of said collar has a toothed periphery.

- 5. (currently amended) A means in accordance with one or more of the previous Claims, c h a r a c t e r i s e d i n that the nut's (5) Claim 1 wherein a rear portion (7) of said nut has a toothed periphery.
- 6. (currently amended) A means of compressing pipe couplings comprising two concentric press surfaces (10, 23) designed to be capable of supporting an axial pressure sufficient to preload a seal (2), c h a r a c t e r i s e d i n that a preloading tool (25) is designed to compress the end portions of the pipes (1, 1'), further comprising two end sections (27, 31) connected to two or more rods (35), each rod (35) being equipped with a hydraulic cylinder (37), the preload on the seal (2) principally being retained by a corresponding threaded nut (5) and collar (15) after removal of the preloading tool (25).
- 7. (currently amended) A means in accordance with Claim 6, c h a r a c t e r i s e d i n that wherein the preloading tool (25) is comprising comprises a nut runner (45).
- 8. (currently amended) A means in accordance with Claim 6, c h a r a c t e r i s e d i n that Claim 7, wherein the nut runner (45) is equipped with a cogwheel (49) allocated to the rotation of a threaded collar (15) with a toothed periphery of the a rear portion of the collar (19).
- 9. (currently amended) A means in accordance with Claim 6, c h a r a c t e r i s e d i n that Claim 7, wherein the nut runner (45) is equipped with a cogwheel (49) allocated to the rotation of a nut (5) with a toothed periphery of the a rear portion of the nut (7).